

Application No. 10/067,513
Attorney Docket No. 30-4324 USA DIV 2
Page 2

AMENDMENT UNDER 37 C.F.R. §1.111

In the claims:

1. (Currently amended) An emulsifiable polyolefin wax having sufficient functionality to be emulsifiable in an aqueous medium, a melt viscosity of less than 1,000 cps at 190°C, a Gardner color index of no greater than about 9, and an emulsion light transmittance of at least 20% at 525 nm with a 20 mm light pathlength in an emulsion comprising about 25 to about 35 wt % emulsifiable wax, about 60 to about 65 wt % water, a base sufficient to form an emulsion having a pH of between about 9 and about 10, and about 4 to about 10.5 wt % nonylphenol with 9 moles of ethoxylation said emulsifiable polyolefin wax being prepared by reacting maleic anhydride with a starting material of either polypropylene or ethylene-propylene copolymer, wherein the amount of said maleic anhydride added to said starting material is about 0.1% to about 25 wt % of said starting material.
2. (Previously amended) A composition comprising the emulsifiable polyolefin wax of claim 1.
3. (Previously amended) The composition of claim 2, wherein said emulsion light transmittance is at least about 50%.
4. (Canceled).
5. (Previously amended) The composition of claim 2, wherein said emulsifiable polyolefin wax has a Mw of about 10,000 to about 20,000, and a melt viscosity of about 200 to about 800 cps.

Application No. 10/067,513
Attorney Docket No. 30-4324 USA DIV 2
Page 3

6. (Original) A floor polish comprising the composition of claim 1.
7. (Original) A floor polish comprising the composition of claim 2.
8. (Previously added) The emulsifiable polyolefin wax of claim 1, wherein said emulsifiable polyolefin wax has a saponification number of about 20 to about 150 KOH/g.
9. (Previously added) The emulsifiable polyolefin wax of claim 1, wherein said wax has a Gardner color index of no greater than about 8.
10. (Previously added) The emulsifiable polyolefin wax of claim 1, wherein said wax has a Gardner color index of no greater than about 7.
11. (Previously amended) A method of using an emulsifiable polyolefin wax to emulsify substances, said method comprising mixing said emulsifiable polyolefin wax with a second substance in an aqueous medium under conditions sufficient to emulsify both said emulsifiable polyolefin wax and said second substance, said emulsifiable polyolefin wax having a melt viscosity of less than 1,000 cps at 190°C, said emulsifiable polyolefin wax being prepared by reacting maleic anhydride with a starting material of either polypropylene or ethylene-propylene copolymer, wherein the amount of said maleic anhydride added to said starting material is about 0.1% to about 25 wt % of said starting material.

Application No. 10/067,513
Attorney Docket No. 30-4324 USA DIV 2
Page 4

12. (Previously added) The method of claim 11, wherein said substance has a Mw greater than that of said emulsifiable polyolefin wax .
13. (Previously added) The method of claim 12, wherein said emulsifiable polyolefin wax has a Mw of about 10,000 to about 20,000, and a melt viscosity of about 200 to about 800 cps.
14. (Currently amended) A process of producing the emulsifiable polyolefin wax, said process comprising adding ethylenically unsaturated polycarboxylic compound to an agitated reactor charged with a polyolefin wax having a Gardner color of no greater than about 2, said ethylenically unsaturated polycarboxylic compound being added at a feed rate of about 1 to about 5 wt % of said polyolefin wax per hour under conditions sufficient to form an emulsifiable polyolefin wax having sufficient functionality to be emulsifiable in an aqueous medium, a melt viscosity of less than 1,000 cps at 190°C, a Gardner color index of no greater than about 9, and an emulsion light transmittance of at least 20% at 525 nm with a 20 mm light pathlength emulsion comprising about 25 to about 35 wt % emulsifiable wax, about 60 to about 65 wt % water, a base sufficient to form an emulsion having a pH of between about 9 and about 10, and about 4 to about 10.5 wt % nonylphenol with 9 moles of ethoxylate wherein the concentration of said ethylenically unsaturated polycarboxylic compound added to said reactor is about 0.1 to about 25 wt. % of said polyolefin wax, and wherein said polyolefin wax is a polypropylene or ethylene-propylene copolymer wax, and said ethylenically unsaturated polycarboxylic compound is maleic anhydride.
15. (Previously added) The process of claim 14, wherein said process is a batch process and wherein said reactor is charged with said polyolefin wax and said ethylenically unsaturated

Application No. 10/067,513
Attorney Docket No. 30-4324 USA DIV 2
Page 5

polycarboxylic compound is fed at substantially constant rate to said reactor over a period of about 0.5 to about 10 hours.

16. (Previously added) The process of claim 15, wherein said ethylenically unsaturated polycarboxylic compound is fed to said reactor at a rate of about 2 to about 4 wt % of said polyolefin wax per hour.

17. (Previously added) The process of claim 15, wherein said reaction is conducted in the presence of a free radical source.

18. (Previously added) The process of claim 15, wherein said free radical initiator is an organic peroxide said organic peroxide being fed to said reactor at a rate of about 0.1 to about 1 wt % of starting material per hour.

19. (Previously added) The process of claim 14, wherein the reactor is charged with a blend of said polyolefin wax and at least another polyolefin wax, wherein said at least another polyolefin wax has a Mw greater than that of said polyolefin wax.